yet known come from Equatorial Africa. My impression is that this form consists of adult birds, probably freshly moulted into their cinnamon plumage.—R. B. S.]

268. CERYLE RUDIS.

Ceryle rudis (Linn.); Sharpe, Cat. B. Brit. Mus. xvii. p. 109 (1892); Reichen. J. f. O. 1892, p. 28 (Bare; Mengo); id. Vög. deutsch. Ost-Afr. p. 130 (1894); Hartert, Ansorge's African Sun, p. 336 (1899: Kibero and Mruli); Neum. J. f. O. 1900, p. 215 (Tanga).

No. 745. 2 ad. Lake Naivasha, Aug. 9, 1897.

269. CERYLE MAXIMA.

Ceryle maxima (Pall.); Sharpe, Cat. B. Brit. Mus. xvii. p. 118 (1892); Reichen. J. f. O. 1892, p. 28 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 130 (1894: Ugálla; Taweta); Neum. J. f. O. 1900, p. 214 (Tanga).

a. ♀ ad. Entebbe, Feb. 18, 1895.

b. 3 ad. ,, May 28, 1895.

[These specimens are apparently true *C. maxima*, and not *C. sharpii*, which Mr. Jackson got in the Sük country (*cf.* Sharpe, Ibis, 1892, p. 316).—R. B. S.]

270. HALCYON SEMICÆRULEUS.

Halcyon semicæruleus (Forskål); Sharpe, Cat. B. Brit. Mus. xvii. p. 232 (1892); id. Ibis, 1892, p. 317 (Turquel); Reichen. Vög. deutsch. Ost-Afr. p. 132 (1894); Jackson, Ibis, 1898, p. 141 (Witu); Hartert, Ansorge's African Sun, p. 335 (1899: Kibero; Kibwezi); Neum. J. f. O. 1900, p. 216 (Manjara Lake).

No. 398. E. Kamassia, Sept. 29, 1896.

No. 912. Ravine, 7500 feet, March 9, 1898.

[These examples seem to me to be inseparable from Abyssinian birds.—R. B. S.]

271. HALCYON PALLIDIVENTRIS.

Halcyon pallidiventris Cab.; Sharpe, Cat. B. Brit. Mus. xvii. p. 235 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 132 (1894: Udjidji; Ugálla River).

No. 1235. 9 ad. Nandi, 6500 feet, June 24, 1898.

[I refer this specimen to *H. pallidiventris*, but with some doubt, as it has the centre of the breast and abdomen white like the throat, and the bird is evidently adult. I do not like to describe it as new from a single specimen.—R. B. S.]

272. HALCYON CHELICUTENSIS.

Halcyon chelicutensis (Stanl.); Sharpe, Cat. B. Brit. Mus. xvii. p. 239 (1892).

Halcyon chelicuti Reichenow, Vög. deutsch. Ost-Afr. p. 131 (1894); Hartert, Ansorge's African Sun, p. 336 (1899); id. Nov. Zool. vii. p. 34 (1900); Neum. J. f. O. 1900, p. 216.

Nos. 68, 69. ♂ ♀ ad. Kibwezi, 3000 feet, March 17, 19, 1892.

No. 13. 3 ad. Entebbe, Sept. 15, 1895.

273. HALCYON CYANOLEUCUS.

Halcyon cyanoleucus (V.); Sharpe, Cat. B. Brit. Mus. xvii. p. 242 (1892); Reichen. J. f. O. 1892, p. 27 (Sesse Isl.); id. Vög. deutsch. Ost-Afr. p. 131 (1894: Itále).

- a. \(\gamma\) ad. Entebbe, Dec. 22, 1894. Bill—lower mandible black, upper crimson-red; feet black; iris brown.
 - b. 3 ad. Entebbe, March 10, 1895.
 - c. ♀ ad. ,, May 26, 1895.
 - d. 3 ad. ,, Aug. 8, 1894.

274. BUCORAX CAFER.

Bucorax cafer (Schl.); Grant, Cat. B. Brit. Mus. xvii. p. 351 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 126, fig. 59 (1894); Neum. J. f. O. 1900, p. 210 (Pambire; Karagwe); Sharpe, Ibis, 1902, p. 110 (Ravine).

Bucorax abyssinicus Sharpe (nec Gm.), Ibis, 1892, p. 317 (Turquel).

a. Head. Busoga, Nov. 1894.

275. LOPHOCEROS MELANOLEUCUS.

Lophoceros melanoleucus (Licht., sen.); Grant, Cat. B. Brit. Mus. xvii. p. 399 (1892); Sharpe, Ibis, 1892, p. 318 (Savé, Mt. Elgon); Reichenow, Vög. deutsch. Ost-Afr. p. 128 (1894); Hinde, Ibis, 1898, p. 582 (Machako's); Hartert, Ansorge's African Sun, p. 334 (1899: Kibwezi);

id. Nov. Zool. vii. p. 33; Neum. J. f. O. 1900, p. 213 (Tanga); Sharpe, Ibis, 1902, p. 110 (Ravine).

a. Ad. Uganda. Nov. 20, 1894.

b. 3 ad. Entebbe, July 7, 1895.

No. 331. 2 ad. Kamassia, 6000 feet, Aug. 23, 1896. Bill dull carmine; feet black; iris dull pale yellow.

No. 1104. 2 ad. Nandi, 6500 feet, May 15, 1898. Bill dull carmine, extreme basal edge yellow; bare part of cheeks greenish blue. Fairly plentiful in pairs, three or four being sometimes seen together.

276. Lophoceros fasciatus.

Lophoceros fasciatus (Shaw); Grant, Cat. B. Brit. Mus. xvii. p. 402 (1892); Reichen. J. f. O. 1892, p. 26 (Mengo); Hartert, Nov. Zool. vii. p. 34 (1900: Tambue).

No. 7. 3 ad. Entebbe, Aug. 26, 1895.

a. 2 ad. Entebbe, Sept. 17, 1895.

277. Lophoceros erythrorhynchus.

Lophoceros erythrorhynchus (Temm.); Grant, Cat. B. Brit. Mus. xvii. p. 409 (1892); Sharpe, Ibis, 1892, p. 318 (Turquel); Reichen. Vög. deutsch. Ost-Afr. p. 128, fig. 60 (1894); Hartert, Ansorge's African Sun, p. 334 (1899: Kinani); id. Nov. Zool. vii. p. 33 (1900); Neum. J. f. O. 1900, p. 213 (Mkaramo; Maunsa).

Nos. 301, 302. 3 2 ad. Elgeyu, 3700 feet, Aug. 19, 1896. Bill crimson-red, with black markings on base of lower mandible; bare skin of cheeks pinkish blue; iris dull yellow.

278. Bycanistes subquadratus.

Bycanistes subquadratus Cab.; Grant, Cat. B. Brit. Mus. xvii. p. 419 (1892); Sharpe, Ibis, 1892, p. 317 (Mt. Elgon).

a. 9 ad. Uganda, Nov. 20, 1894.

b. 3 ad. Entebbe, Feb. 6, 1895.

279. UPUPA AFRICANA.

Upupa africana Bechst.; Salvin, Cat. B. Brit. Mus. xvi. p. 14 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 137, fig. 64 (1894); Hinde, Ibis, 1898, p. 582 (Machako's);

Hartert, Ansorge's African Sun, p. 336 (1899: Mau and Kariandus); Neum. J. f. O. 1900, p. 220 (Mkaramo).

Upupa minor Shaw; Sharpe, Ibis, 1892, p. 319 (Machako's; Turquel).

No. 66. 3 ad. Kibwezi, 3000 feet, March 17, 1892.

280. Irrisor Erythrorhynchus.

Irrisor erythrorhynchus (Lath.); Grant, Ibis, 1902, p. 433.

No. 253. 3 ad. Elgeyu, 3700 feet, Aug. 14, 1896. Bill vermilion; feet coral-red; iris brown. Plentiful in small parties.

281. IRRISOR DAMARENSIS.

Irrisor viridis (nec Licht.); Hinde, Ibis, 1898, p. 582 (Machako's).

Irrisor damarensis Grant, Ibis, 1902, p. 434, pl. x. fig. 1.

No. 31. 2 ad. Kibwezi, 3000 feet, March 7, 1892.

No. 87. & ad. Ngomeni, April 4, 1892.

282. Irrisor Jacksoni.

Irrisor jacksoni Sharpe; Salvin, Cat. B. Brit. Mus. xvi. p. 21, pl. iii. fig. 1 (1892); Sharpe, Ibis, 1892, p. 319 (Kikuyu); Hartert, Ansorge's African Sun, p. 337 (1899: Eldoma Ravine); id. Nov. Zool. vii. p. 35 (1900: Nairobe); Neum. J. f. O. 1900, p. 221 (Mau Forest); Sharpe, P. Z. S. 1900, p. 601 (Kenya Forest, 8000 feet).

No. 566. 3 ad. Ravine, March 28, 1897. Bill, feet, and eyelids dark coral-red; iris brown. One out of a small family-party. Plentiful.

Nos. 964, 965. S ad. Nandi Forest, April 10, 1898. Bill dark carmine; eyelids dark crimson; feet dusky coralred; iris brown.

No. 1273. 3 ad. Nandi, 6500 feet, July 8, 1898. Stomach contained beetles.

283. Rhinopomastus schalowi.

Rhinopomastus cyanomelas (V., part.); Salvin, Cat. B. Brit. Mus. xvi. p. 24 (1892); Reichenow, Vög. deutsch.

Ost-Afr. p. 138 (1894); Hartert, Ansorge's African Sun, p. 337 (1899: Samburu).

Rhinopomastus schalowi Neum. J. f. O. 1899, p. 221; Sharpe, Ibis, 1902, p. 110.

Nos. 486, 487. 3 ad. Ravine, Feb. 26, 1897. Bill dark brownish black; feet black; iris brown. This is a scarce bird; on one other occasion only have I seen it. The pair were found in open bush country, and later all the Irrisors were never long in the same tree or bush, but kept flying from one to another.

Nos. 548, 549. \Im ad. Ravine, March 21, 1897. Up to the present I have always seen these birds in pairs, creeping about in thick foliage, and clinging in all sorts of positions to the trunks of dead trees, looking for beetles, spiders, and other insects. I have not heard them call, like the large *Irrisor jacksoni*.

[The characters given by Mr. Oscar Neumann hold good in the case of Mr. Jackson's series, but the Nyasaland birds are also apparently R. schalowi. Birds from Manda Island (Jackson) and Doruma (Hunter) appear to be true R. cyanomelas, while some of the Mashona specimens are slightly intermediate.—R. B. S.]

284. Rhinopomastus cabanisi.

Rhinopomastus cabanisi (De Fil.); Salvin, Cat. B. Brit. Mus. xvi. p. 26 (1892); Sharpe, Ibis, 1892, p. 319 (Butzsuma); Reichen. Vög. deutsch. Ost-Afr. p. 138 (1894: Taweta; Ugógo; Wembere Steppes); Neum. J. f. O. 1900, p. 223 (Kibaya).

a. Ad. Kikuyu.

b. Imm. Kinani, Sept. 1894.

No. 267. 3 ad. Elgeyu, 3700 feet, Aug. 15, 1896. Bill orange-red, tip dull black; feet black; iris brown. Only one seen.

285. MELITTOPHAGUS CYANOSTICTUS.

Melittophagus cyanostictus Cab.; Sharpe, Cat. B. Brit. Mus. xvii. p. 48, pl. i. fig. 3 (1892); id. Ibis, 1892, p. 319 (Mount Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 136 (1894); Hinde, Ibis, 1898, p. 583 (Machako's); Hartert, Nov. Zool. vii. p. 35 (1900: Mubende); Sharpe, Hand-l. B. ii. p. 237 (1900); id. Ibis, 1902, p. 110 (Lake Baringo).

Melittophagus sharpei Hartert, Bull. B. O. C. x. p. xxvii (1899); Sharpe, Hand-l. B. ii. p. 72 (1900).

Melittophagus pusillus cyanostictus Neum. J. f. O. 1900, p. 219 (Tanga; Umbugwe).

No. 103. & ad. Ndara, Teita, April 7, 1892.

No. 308. \$\pi\$ ad. Elgeyu, 3700 feet, Aug. 20, 1896. Bill black; feet scaly brown; iris crimson.

286. Melittophagus pusillus.

Melittophagus pusillus (P. L. S. Müll.); Sharpe, Cat. B. Brit. Mus. xvii. p. 47, pl. i. fig. 5 (1892).

a. Ad. Kikuyu.

Nos. 56, 57. 3 ad. Entebbe, Oct. 4, 1895.

No. 1105. & juv. Nandi, 6000 feet, May 15, 1898.

287. MELITTOPHAGUS VARIEGATUS.

Melittophagus variegatus (Vieill.); Sharpe, Cat. B. Brit. Mus. xvii. p. 48 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 136 (1894: Bukoba).

Melittophagus sonnini Boie; Reichen. J. f. O. 1892, p. 29 (Mengo; Uliambiri).

a. Q ad. Entebbe, Jan. 13, 1895. Bill black; feet brown; iris crimson.

288. Melittophagus oreobates. (Plate XVI. fig. 1.)

Melittophagus oreobates Sharpe, Ibis, 1892, p. 320 (Savé, Elgon; Kimangitschi); Neum. J. f. O. 1900, p. 219 (Marangu; Loita Mts.); Sharpe, P. Z. S. 1900, p. 602 (Nairobe Forest).

No. 963. 3 imm. Nandi Forest, April 10, 1898. Bill black; feet dull slate-coloured; iris brown.

No. 1139. & ad. Nandi, 6500 feet, May 23, 1898.

No. 1207. 3 ad. Nandi, 6500 feet, June 13, 1898. Scarce. Seen in small flocks of three or four.

289. MELITTOPHAGUS ALBIFRONS.

Melittophagus albifrons (Cab. & Heine); Sharpe, Cat. B.



1.MELITTOPHAGUS OREOBATES.

2 BARBATULA JACKSONI.



Brit. Mus. xvii. p. 53 (1892); id. Ibis, 1892, p. 320 (Masailand).

Melittophagus bullockoides (Smith); Reichen. Vög. deutsch. Ost-Afr. p. 136 (1894: Rovuma River; Usegúha).

Merops bullockoides Hartert, Ansorge's African Sun, p. 336 (1899: Lake Naivasha; Kedong).

No. 259. & ad. Elgeyu, 3700 feet, Aug. 14, 1896. Bill and feet black; iris brown. Plentiful.

Nos. 391, 392. 2 ad. E. Kamassia, Sept. 28, 1896. Plentiful in flocks.

No. 466. 3 ad. Ravine, Feb. 19, 1897. Resident throughout the year and plentiful throughout the district. Breeding in a bank in a colony, in holes about two feet and a half deep; no lining. Eggs, two or three, much incubated. Several nests with young.

Nos. 490, 491. 3 and Ravine, Feb. 28, 1897. Colony of about ten or fifteen pairs breeding in a bank by a dry stream. Holes about two to three feet deep; no lining. Eggs, two or three, laid on bare earth.

Nos. 761, 813. ♂♀ ad. Lake Naivasha, Aug. 12, 29, 1897.

290. MEROPS APIASTER.

Merops apiaster Linn.; Sharpe, Cat. B. Brit. Mus. xvii. p. 63 (1892); id. Ibis, 1892, p. 319 (Marungu; Sotik); Reichen. Vög. deutsch. Ost-Afr. p. 135 (1894); Hartert, Ansorge's African Sun, p. 336 (1899: Muani); Neum. J. f. O. 1900, p. 218 (Umbugwe).

No. 952. 3 ad. Nandi, 5500 feet, April 9, 1898. Bill black; feet blackish brown; iris crimson. Shot out of a small flock.

291. Merops superciliosus.

Merops superciliosus Linn.; Sharpe, Cat. B. Brit. Mus. xvii. p. 70 (1892); Reichen. J. f. O. 1892, p. 28; id. Vög. deutsch. Ost-Afr. p. 135, fig. 63 (1894).

No. 101. & ad. Ndi-Ndara, Teita, April 7, 1892.

a, b. $3 \circ ad$. Entebbe, Aug. 4, 1895. Bill black; feet scaly horn-coloured; iris crimson.

No. 362. & ad. Molo River, Sept. 17, 1896.

292. MEROPS ALBICOLLIS.

Merops albicollis Vieill.; Sharpe, Cat. B. Brit. Mus. xvii. p. 76 (1892); Reichen. J. f. O. 1892, p. 29 (Mengo; Mjonjo; Manjongo); id. Vög. deutsch. Ost-Afr. p. 134 (1894); Hartert, Ansorge's African Sun, p. 336 (1899: Kampala; Masindi); Neum. J. f. O. 1900, p. 217 (Ndalalani; Pinnini).

a. ♂ ad. Entebbe, Dec. 31, 1894. Bill black; feet pale olive-green; iris crimson.

Nos. 271, 272. & ad. Elgeyu, 3700 feet, Aug. 16, 1896.
No. 597. & ad. Ravine, April 1, 1897. In small flocks of four or five.

293. Scotornis climacurus.

Scotornis climacurus (Vieill.); Hartert, Cat. B. Brit. Mus. xvi. p. 596 (1892); id. Tierreich, Aves, Liefer. i. p. 29 (1897).

No. 65. 3 ad. Entebbe, Oct. 8, 1895.

294. Caprimulgus natalensis.

Caprimulgus natalensis Smith; Hartert, Cat. B. Brit. Mus. xvi. p. 564 (1892); id. Tierreich, Aves, Liefer. i. p. 44 (1897).

a. ♀ ad. Entebbe, March 5, 1895.

b. 3 ad. ,, May 9, 1895.

c. \approx ad. ,, July 10, 1895. Bill dusky; feet pale brown; iris brown.

[This is an interesting new habitat for the species. I cannot separate Mr. Jackson's specimens from typical C. natalensis.—R. B. S.]

295. Caprimulgus nigriscapularis.

Caprimulgus nigriscapularis Reichenow, Orn. MB. i. p. 31 (1893); Hartert, Tierreich, Aves, Liefer. i. p. 46 (1897).

a. 3 ad. Entebbe, May 11, 1895. Feet brown.

[I do not think that there can be any doubt of this Nightjar being referable to *C. nigriscapularis*, with the main features of which it appears to agree. The breast and abdomen in Mr. Jackson's specimen are rufescent, regularly but narrowly barred with dusky blackish (this hardly suits Dr. Reichenow's diagnosis, "uropygio et abdomine fulvo

nigroque fasciolatis"), and some of the tail-feathers are rufous with dusky blackish mottling and broken bars ("rectricibus fusco-nigris rufescente-variis" scarcely expresses the pattern). Seeing, however, that it agrees in the black spots of the scapulars, the marking of the quills, and in the habitat, I think that the slight differences mentioned above would not be of specific value. The first quill is unspotted, the second has a white spot on the inner web, and the third and fourth quills have white spots on each web, forming a band across these quills. Long. tot. 9.0, culm. a fronte basali 0.8, alæ 5.8, caudæ circa 4.75, tarsi 0.5.—R. B. S.]

296. Caprimulgus inornatus.

Caprimulgus inornatus Heugl.; Hartert, Cat. B. Brit. Mus. xvi. p. 556 (1892); Sharpe, Ibis, 1892, p. 322 (Makarungu); Reichen. Vög. deutsch. Ost-Afr. p. 139 (1894: Usaramo); Hartert, Tierreich, Aves, Liefer. i. p. 29 (1897); Neum. J. f. O. 1900, p. 224 (Tanga).

No. 87. & juv. Ravine, May 31, 1896.

297. Caprimulgus poliocephalus.

Caprimulgus poliocephalus Rüpp.; Hartert, Cat. B. Brit. Mus. xvi. p. 546 (1892); Sharpe, Ibis, 1892, p. 322 (Kimangitschi); Hartert, Tierreich, Aves, Liefer. i. p. 52 (1897).

No. 240. & ad. Elgeyu, 5000 feet, Aug. 11, 1896. Bill black; feet brownish flesh-coloured; iris brown.

No. 522. & ad. Ravine, March 7, 1897.

298. CAPRIMULGUS TRIMACULATUS.

Caprimulgus lentiginosus Smith; Hartert, Cat. B. Brit. Mus. xvi. p. 536 (1892).

Caprimulgus trimaculatus (Swains.); Hartert, Tierreich, Aves, Liefer. i. p. 55 (1897).

No. 937. 2 ad. Kavirondo, 4500 feet, April 1, 1898. Bill black; feet brown; iris brown.

299. CAPRIMULGUS EUROPÆUS.

Caprimulgus europæus Linn.; Hartert, Cat. B. Brit. Mus. xvi. p. 526 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 139

together with the smaller species with white throat. Stomach contained large numbers of living bees and beetles.

[The above specimen belongs to the true *C. aquatorialis* (wing 7.95), like Mr. Jackson's former Sotik examples (wing 7.6-8.2), and not to the smaller *C. niansæ* of Reichenow, which has a wing under 6 inches.—R. B. S.]

302. Cypselus shelleyi.

Cypselus shelleyi Salvad. Ann. Mus. Genov. (2) vi. p. 227 (1888: Shoa); Hartert, Cat. B. Brit. Mus. xvi. p. 445, note (1892); Sharpe, Hand-l. B. ii. p. 95 (1900).

Apus shelleyi Hartert, Tierreich, Aves, Liefer. i. p. 86 (1897).

No. 225. 3 ad. Mau, 7800 feet, Aug. 8, 1896. Bill black; feet brown; iris brown.

No. 877. 3 ad. Nandi, 6500 feet, Feb. 16, 1898. In flocks in the evening, together with Swallows.

a. 2 ad. Lake Naivasha, Sept. 10, 1898.

[The differences between *C. shelleyi* and *C. pekinensis* are very slight, and the blunter termination to the outer tail-feathers is a scarcely perceptible character.—R. B. S.]

303. Cypselus barbatus.

Micropus barbatus (Scl.); Hartert, Cat. B. Brit. Mus. xvi. p. 447 (1892).

Apus barbatus Hartert, Tierreich, Aves, Liefer. i. p. 86 (1897).

Cypselus barbatus Sharpe, Hand-l. B. ii. p. 96 (1900).

Nos. 223, \circ ; 224, \circ ad. Mau, 7800 feet, Aug. 8, 1896. Bill black; feet brown; iris brown. These specimens were shot out of one flock.

No. 936. & ad. Kavirondo, 4500 feet, April 1, 1898.

[The female from Mau has very broad black streaks on the throat, as in Cape specimens of *C. barbatus*, but the other two examples have very fine streaks. The abdominal feathers all have white margins. It seems to me to be by no means impossible that *C. barbatus* is only the young of *C. apus* after its first autumn moult, though Mr. Hartert thinks otherwise. In any case *C. barbatus* is now found for the first time in East Africa.—R. B. S.]

304. Cypselus streubeli.

Cypselus streubeli Hartl.; Sharpe, Ibis, 1892, p. 322 (Jinji, Uganda).

Micropus streubeli Hartert, Cat. B. Brit. Mus. xvi. p. 452 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 143 (1894: Bussissi).

Apus caffer struebeli, Hartert, Tierreich, Aves, Liefer. i. p. 87 (1897).

Apus struebeli, Neum. J. f. O. 1900, p. 224 (Bulamwezi). a, b. ♂ ♀ ad. Entebbe, Feb. 18, 1895.

305. Colius macrurus.

Colius macrurus (Linn.); Sharpe, Cat. B. Brit. Mus. xvii. p. 345 (1892); Reichen. Vög. deutsch. Ost-Afr. p. 105 (1894: Pare Mts.).

No. 397. 3 ad. East Kamassia, Sept. 29, 1896. Tip of upper mandible and entire under mandible dull black; feet plum-coloured; iris dark crimson; eyelids Indian red; base of upper mandible coral-pink.

Nos. 450, 451. ♂ ♀ ad. Kedong Valley, Feb. 2, 1897.

306. Colius Berlepschi.

Colius berlepschi Hartert; Sharpe, Ibis, 1902, p. 111 (Eldoma Ravine).

Nos. 45, 46. ∂ ♀ ad. Entebbe, Oct. 2, 1895.

Nos. 196, 197. 2 ad. Ravine, July 24, 1896. Bill black with upper half horn-blue, lower mandible white; feet dark coral-red; iris, upper half yellow, lower half green. Nest in tree twenty feet from the ground, made throughout of dry stems of a creeper and a few dry leaves. Eggs three. Plentiful in small flocks of six to ten.

No. 372. 2 ad. Njemps, Sept. 20, 1896.

No. 429. 2 ad. Ravine, Nov. 28, 1896. Now in family parties; young birds without long tail-feathers.

No. 614. 3 ad. Ravine, April 8, 1897.

No. 866. \$\gamma\$ ad. Nandi, 6500 feet, Feb. 14, 1898. Now in flocks up to twenty in number.

Order TROGONES.

307. HAPALODERMA NARINA.

Hapaloderma narina (Steph.); Grant, Cat. B. Brit. Mus. xvii. p. 477 (1892); Sharpe, Ibis, 1892, p. 321 (River Kilini; Savé, Mt. Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 122 (1894); Neum. J. f. O. 1900, p. 207 (Moschi; Ngare Dobasch; Tanga); Sharpe, P. Z. S. 1900, p. 601 (Nairobe Forest; Mt. Kenya).

No. 108. 3 ad. Ravine, June 22, 1896. Bill greenish horn-coloured, base yellow; feet brownish flesh-coloured; bare skin of throat blue; iris crimson-brown. Fairly plentiful in the thick forest.

Nos. 234, 241. 3 ad. Elgeyu, 5000 feet, Aug. 11, 1896. Bill greenish yellow at base, fading into bluish-white horn-colour; bare skin at base of gape behind eye soft green, with pale blue edges; feet pale brownish flesh-coloured; iris bright brown. Always on the edge of thick forest. Feeds on caterpillars, &c., and catches insects on the wing like a Flycatcher.

No. 612. \(\perp\$. Ravine, April 7, 1897. Iris crimson-brown; upper eyelid pale blue; bare patch behind eye yellowish green, with pale blue edges; patch at base of bill the same; bill bluish horn-coloured; base of lower mandible yellow; feet brownish flesh-coloured. Stomach full of tree-bugs, insects, &c.

No. 847. \$\chi\$ imm. Nandi Forest, 6000 feet, Feb. 10, 1898. No. 908. \$\chi\$ ad. Ravine, 7500 feet, March 7, 1898. Bill dull yellowish green, base of lower mandible yellow; feet dusky flesh-coloured.

Order COCCYGES.

308. Turacus leucolophus.

Turacus leucolophus Heugl.; Shelley, Cat. B. Brit. Mus. xix. p. 444 (1891); Sharpe, Ibis, 1892, p. 313 (Turquel; Mt. Elgon); Neum. J. f. O. 1899, p. 72.

No. 314. Q ad. Kamassia, 4000 feet, Aug. 21, 1896. Bill pale pea-green at base, shading into greenish yellow along the culmen and at the tip; feet black; iris brown; eyelids coral-red. Plentiful in the wooded water-courses.

309. Turacus hartlaubi.

Turacus hartlaubi (Fischer & Reichen.); Shelley, Cat. B. Brit. Mus. xix. p. 445 (1891); Sharpe, Ibis, 1892, p. 313 (Kikuyu Forest; Mt. Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 103, fig. 46 (1894); Hartert, Ansorge's African Sun, p. 332 (1899: Subugo Forest); id. Nov. Zool. vii. p. 31 (1900: Nairobe); Neum. J. f. O. 1899, p. 72 (Mau); Sharpe, P. Z. S. 1900, p. 601 (Nairobe Forest); id. Ibis, 1902, p. 111.

No. 141. 2 ad. Nandi, 6500 feet, June 2, 1896. Bill dull dusky carmine; feet black; iris brown; eyelids bright coral-red.

No. 205. 3 ad. Ravine, July 30, 1896. Very plentiful in the forests. In May I saw sixteen in one tree, attracted by a small fruit.

No. 1103. & ad. Nandi Forest, May 14, 1898.

Nos. 1131, 1132. ♀ ♂ ad. Nandi Forest, 6000 feet, May 19, 1898.

310. Musophaga Rossæ.

Musophaga rossæ Gould; Shelley, Cat. B. Brit. Mus. xix. p. 448 (1891); Reichen. J. f. O. 1892, p. 21 (Bukoba; Sesse Island); Sharpe, Ibis, 1892, p. 313 (Mt. Elgon; Kazamoja); Reichen. Vög. deutsch. Ost-Afr. p. 101 (1894); Hinde, Ibis, 1898, p. 581 (Machako's); Neum. J. f. O. 1899, p. 68; Sharpe, Ibis, 1902, p. 112.

a, b, c. 2 ad. Entebbe, Dec. 18, 20, 28, 1894. Bill yellow, fading into orange-red at top of shield and sides of lower mandible; iris brown.

311. Corythæola cristata.

Corythæola cristata (Vieill.); Shelley, Cat. B. Brit. Mus. xix. p. 449 (1891); Reichen. J. f. O. 1892, p. 21 (Mengo and Mjonjo); id. Vög. deutsch. Ost-Afr. p. 101 (1894); Neum. J. f. O. 1899, p. 67 (Entebbe); Hartert, Nov. Zool. vii. p. 31 (1900); Sharpe, Ibis, 1902, p. 112.

a. Ad. Buganda, Dec. 7, 1894. Bill bright yellow, tip in front of nostrils dull crimson; feet black; iris crimson; bare skin round the eyes slate-coloured.

b. of ad. Entebbe, Dec. 29, 1894.

312. Schizorhis zonura.

Schizorhis zonura Rüpp.; Shelley, Cat. B. Brit. Mus. xix. p. 451 (1891); Sharpe, Ibis, 1892, p. 314 (Turquel; Kitosh); Reichen. J. f. O. 1892, p. 21 (Bukoba; Kimoani; Mengo; Mjonjo); id. Vög. deutsch. Ost-Afr. p. 101 (1894: Kagéyi); Sharpe, Ibis, 1902, p. 112 (Uvuma Island).

Chizaerhis zonura Neum. J. f. O. 1899, p. 68 (Bukoba). No. 60. ♀ ad. Entebbe, Oct. 6, 1895.

a, b. 3 ♀ ad. Busoga, Nov. 18, 1894. 3. Bill pale peagreen; feet black; iris brown. ♀. Bill greenish yellow; feet dusky slate-coloured; iris brown.

313. Schizorhis Leucogaster.

Schizorhis leucogaster Rüpp.; Shelley, Cat. B. Brit. Mus. xix. p. 452 (1891); Sharpe, Ibis, 1892, p. 314 (Nzoni; Turquel); Reichen. Vög. deutsch. Ost-Afr. p. 102 (1894); Hinde, Ibis, 1898, p. 582 (Machako's); Hartert, Ansorge's African Sun, p. 332 (1899: Muani).

No. 1. ? ad. Damma, Dec. 23, 1891. No. 100. & ad. Ndi, Teita, April 6, 1892.

314. Coccystes cafer.

Coccystes cafer (Licht.); Shelley, Cat. B. Brit. Mus. xix. p. 221 (1891); Reichen. J. f. O. 1892, p. 23 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 109 (1894); Hartert, Nov. Zool. vii. p. 31 (1900: Karimia); Sharpe, Ibis, 1902, p. 113 (Lake Baringo).

No. 521. 3 imm. Ravine, March 7, 1897. Bill black, gape yellow; feet horn-blue; iris brown. First seen, evidently a rare bird. Stomach full of caterpillars.

315. Cuculus gularis.

Cuculus gularis Steph.; Shelley, Cat. B. Brit. Mus. xix. p. 244 (1891); Reichen. Vög. deutsch. Ost-Afr. p. 110, fig. 50 (1894: Kakoma; Karéma); Neum. J. f. O. 1900, p. 192 (Kwa Kitoto).

No. 69. 3 ad. Lake Naivasha, April 20, 1896. Bill, base yellow shading into dull green, culmen and tip black; feet yellow; iris orange-red; eyelids greenish yellow.

Several seen along the road from Naivasha to Ravine, evidently migrating.

316. Cuculus canorus.

Cuculus canorus Linn.; Shelley, Cat. B. Brit. Mus. xix. p. 245 (1891); Reichen. Vög. deutsch. Ost-Afr. p. 110 (1894); Neum. J. f. O. 1900, p. 193 (Tanga).

No. 78. 3 ad. North of Elmiteita, April 25, 1896. Bill black with base of lower mandible greenish, fading into vellow at gape; feet yellow; iris pale brown; eyelids greenish yellow.

No. 629. 3 ad. Ravine, April 14, 1897. Bill dull black, base of lower mandible horn-blue, gape yellow; iris dull yellow; eyelids bright yellow. Several seen within the previous few days. Stomach full of hairy caterpillars.

317. Cuculus solitarius.

Cuculus solitarius Steph.; Shelley, Cat. B. Brit. Mus. xix. p. 258 (1891); Sharpe, Ibis, 1892, p. 315 (Mt. Elgon; Njemps); Reichen. Vög. deutsch. Ost-Afr. p. 109 (1894); Neum. J. f. O. 1900, p. 192 (Kibwezi; Moschi; Kwa Kitoto).

- a. 3 ad. Entebbe, March 10, 1895.
- b. . & ad. Kampala, March 25, 1895.
- e. 9 ad. Entebbe, April 7, 1895.
- d. 3 pull. Entebbe, May 19, 1895.

No. 393. 3 ad. E. Kamassia, 5000 feet, Sept. 28, 1896. Bill dusky black, lower mandible dusky yellow; feet light yellow; iris brown; eyelids yellow. Plentiful at Njemps. More often heard than seen.

318. Cuculus clamosus.

Cuculus clamosus Lath.; Shelley, Cat. B. Brit. Mus. xix. p. 260 (1891); Reichen. Vög. deutsch. Ost-Afr. p. 111 (1894); Neum. J. f. O. 1900, p. 193 (Magila).

No. 554. § imm. Ravine, March 24, 1897. Bill very dark brown, almost black; feet flesh-coloured, toes brown; iris dark brown. This is the first example of this species that I have met with.

No. 1007. 3 imm. Nandi, 6500 feet, June 20, 1898.

I thought at one time that this Cuckoo was only a migrant, but I have found since that it is a resident, as several have been seen and heard of late.

No. 1206. & imm. Nandi, 6500 feet, June 13, 1898.

319. METALLOCOCCYX SMARAGDINEUS.

Chrysococcyx smaragdineus (Swains.); Shelley, Cat. B. Brit. Mus. xix. p. 280 (1891); Sharpe, Ibis, 1892, p. 315 (Mararu, Teita); Reichen. J. f. O. 1892, p. 23 (Sesse Island); id. Vög. deutsch. Ost-Afr. p. 112 (1894); Neum. J. f. O. 1900, p. 194 (Moschi).

Metallococcyx smaragdineus Sharpe, Hand-l. B. ii. p. 161 (1900).

Nos. 21, 36, 41. 3 ad. Kibwezi, 3000 feet, March 1, 9, 1892.

- a. 3 ad. Entebbe, April 29, 1895.
- b. 3 ad. ,, May 8, 1895.
- c. Ad. ,, Aug. 2, 1895.

No. 1248. 3 ad. Nandi, June 27, 1898. Bill dull peagreen, tip dusky brown; feet bright horn-blue; iris dark brown; eyelids pale bluish green. A scarce bird. Occasionally heard.

320. CHRYSOCOCCYX KLAASI.

Chrysococcyx klaasi (Steph.); Shelley, Cat. B. Brit. Mus. xix. p. 283 (1891); Reichen. J. f. O. 1892, p. 23 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 111 (1894); Neum. J. f. O. 1900, p. 193 (Kwa Lubwa).

No. 26. 9 ad. Kibwezi, 3000 feet, March 3, 1892.

a. 3 ad. Entebbe, Dec. 31, 1894.

b. ? imm.; c. 3 ad. Entebbe, May 8, 9, 1895.

No. 233. 3 ad. Elgeyu, 5000 feet, Aug. 10, 1896. Bill dull pea-green with black tip; feet scaly greenish horn-coloured; iris brown; eyelids pale greenish blue.

No. 480. 3 ad. Ravine, Feb. 23, 1897. Iris brown, with outer ring of dull yellow; eyelid green. First seen at the Ravine; evidently a scarce bird. Stomach full of insects.

321. Chrysococcyx cupreus.

Chrysococcyx cupreus (Bodd.); Shelley, Cat. B. Brit. Mus.

xix. p. 285 (1891); Sharpe, Ibis, 1892, p. 315 (Makarungu, Ukambani); Reichen. J. f. O. 1892, p. 24 (Bukoba; Sesse Island); id. Vög. deutsch. Ost-Afr. p. 111 (1894); Hartert, Nov. Zool. vii. p. 32 (1900); Neum. J. f. O. 1900, p. 193.

No. 44. ♀ ad. Kibwezi, 3000 feet, March 11, 1892.

a. ♂. Entebbe, March 14, 1895.

322. Centropus monachus.

Centropus monachus Rüpp.; Shelley, Cat. B. Brit. Mus. xix. p. 359 (1891); Sharpe, Ibis, 1892, p. 315 (Kikuyu); Reichen. J. f. O. 1892, p. 22 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 107 (1894: Kakoma; Bussissi).

No. 167. \$\pi\$ ad. Nandi, 7000 feet, July 9, 1896. Bill black; feet dark slate-coloured; iris crimson. Several heard, but few seen.

No. 934. \$\mathref{1}\$ ad. Kavirondo, 4500 feet, March 28, 1898. No. 1171. \$\mathref{2}\$ ad. Nandi, 6500 feet, May 25, 1898.

323. Centropus senegalensis.

Centropus senegalensis (Linn.); Shelley, Cat. B. Brit. Mus. xix. p. 360 (1891).

No. 941. 3 ad. Kavirondo, 4500 feet, April 7, 1898. Bill black; feet slate-coloured; iris bright crimson. Very plentiful.

324. Centropus superciliosus.

Centropus superciliosus Hempr. & Ehr.; Shelley, Cat. B. Brit. Mus. xix. p. 363 (1891); Reichen. J. f. O. 1892, p. 22 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 107, fig. 49 (1894); Jackson, Ibis, 1898, p. 140 (Witu); Hartert, Ansorge's African Sun, p. 334 (1899: Kampala); id. Nov. Zool. vii. p. 32 (1900: Karimia); Neum. J. f. O. 1900, p. 191 (Naivasha Lake); Sharpe, Ibis, 1902, p. 113.

No. 69. &. Entebbe, Oct. 20, 1895.

325. CEUTHMOCHARES INTERMEDIUS.

Ceuthmochares intermedius Sharpe, Journ. Linn. Soc., Zool. xvii. p. 432 (1884: Niam-Niam Country); Neum. J. f. O. 1900, p. 191 (Entebbe).

Ceuthmochares aereus (Vieill.); Reichen. J. f. O. 1892, p. 23 (Bukoba).

a. 9 ad. Entebbe, Jan. 11, 1895.

b. 2 ad. Entebbe, March 8, 1895. Bill yellow; feet very dark horn-blue; iris crimson; bare skin round the eye greenish blue.

c, d. 3 2 ad. Entebbe, April 28, 29, 1895.

Order SCANSORES.

326. Indicator variegatus.

Indicator variegatus Less.; Shelley, Cat. B. Brit. Mus. xix. p. 7 (1891); Sharpe, Ibis, 1892, p. 309 (Savé, Mt. Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 113 (1894); Neum. J. f. O. 1900, p. 194 (Moschi; Kwa Kitoto).

No. 315. 2 ad. Kamassia, 4000 feet, Aug. 22, 1896. Bill dark brownish black, with pale brown lower mandible; feet olive-green; iris brown. Fairly plentiful.

No. 1012. 3 ad. Nandi, 6500 feet, April 20, 1898. Bill blackish brown, base of lower mandible dusky horn-coloured; feet green.

327. Indicator teitensis.

Indicator minor Steph.; Shelley, Cat. B. Brit. Mus. xix. p. 9, part. (1891); Reichen. Vög. deutsch. Ost-Afr. p. 114 (1894).

Indicator minor teitensis Neum. J. f. O. 1900, p. 195. No. 64. Q ad. Kibwezi, 3000 feet, March 17, 1892.

328. Lybius Æquatorialis.

Melanobucco æquatorialis Shelley, Cat. B. Brit. Mus. xix. p. 19, pl. i. (1891); Sharpe, Ibis, 1892, p. 309 (Savé, Mt. Elgon); Neum. J. f. O. 1900, p. 196 (Kwa Raschounjo; Kwa Kitoto; Kwa Kago); Sharpe, Ibis, 1902, p. 113 (Mount Ruwenzori).

Pogonorhynchus æquatorialis Reichen. J. f. O. 1892, p. 26 (Bukoba); id. Vög. deutsch. Ost-Afr. p. 115 (1894).

Melanobucco bidentatus aquatorialis Hartert, Nov. Zool. vii. p. 32 (1900: Kichuchu, Toru).

Lybius æquatorialis Richmond, Auk, xvii. p. 179 (1900); Sharpe, Hand-l. B. ii. p. 178 (1900).

- a. 3 ad. Entebbe, Dec. 22, 1894.
- b. 3 ad. Entebbe, Jan. 1, 1895. Bill white; bare skin of eye yellow; feet dark olive-brown; iris brown.
 - c. ♀ ad. Entebbe, June 6, 1895.

No. 925. Q ad. Nandi, 6500 feet, March 22, 1898. Bill white; skin of eye greenish yellow; feet black; iris brown, with greenish outer rim.

No. 982. ? ad. Nandi, 6500 feet, April 13, 1898.

No. 1003. 2 ad. Nandi, 6500 feet, April 17, 1898.

No. 1234. Q ad. Nandi, 6500 feet, June 24, 1898. Bill yellowish white; bare skin of eye yellow; feet slaty brown, white line between tendon and tarsus; iris brown, with outer ring of silvery grey.

329. Tricholæma ansorgii.

Tricholæma ansorgei Shelley, Bull. Brit. Orn. Club, v. p. iii (1895: Uganda); Sharpe, Hand-l. B. ii. p. 179 (1900).

- a. 3 ad. Entebbe, May 26, 1895.
- b. 3 ad. ,, June 4, 1895.
- c. 3 ad. ,, June 7, 1895. Bill black; feet scaly slate-coloured; iris dark crimson.

330. Tricholæma stigmatothorax.

Tricholæma stigmatothorax Cab.; Shelley, Cat. B. Brit. Mus. xix. p. 29, pl. ii. fig. 1 (1891); Sharpe, Ibis, 1892, p. 309 (Butzsuma); Reichen. Vög. deutsch. Ost-Afr. p. 116 (1894); Neum. J. f. O. 1900, p. 197 (Nguruman; Kibwezi).

- a. d ad. Tsavo-Maunga, Dec. 28, 1891.
- b. 3 ad. Kinani, Sept. 22, 1894. Bill black; feet scaly slate-coloured; iris brown. Very plentiful.

331. Tricholæma lachrymosa.

Tricholæma lachrymosum Cab.; Shelley, Cat. B. Brit. Mus. xix. p. 31 (1891); Reichen. J. f. O. 1892, p. 25 (Bussissi; Bukoba; Kimoani); id. Vög. deutsch. Ost-Afr. p. 116 (1894); Hartert, Ansorge's African Sun, p. 335 (1899: Masongoleni); id. Nov. Zool. vii. p. 32 (1900: Kitagwetoa); Neum. J. f. O. 1900, p. 197 (Kikumbuliu).

Nos. 28, 29. 3 2 ad. Kibwezi, 3000 feet, March 4, 1892.

332. TRICHOLÆMA MASSAICA.

Tricholæma massaicum (Reichen.); Shelley, Cat. B. Brit. Mus. xix. p. 34 (1891: Masailand); Reichen. Vög. deutsch. Ost-Afr. p. 117 (1894); Neum. J. f. O. 1900, p. 198 (Kwa Raschuonjo).

No. 285. 3 ad. Elgeyu, 3700 feet, Aug. 17, 1896. Bill dark slate-coloured; feet dark horn-blue; iris brown.

Nos. 681, 700. & ad. Ravine, July 22, 27, 1897.

Nos. 746, 758 A, 759, \$\parallar{2}\$ ad.; 805, \$\parallar{2}\$ ad. Lake Naivasha, Aug. 9-26, 1897.

333. Gymnobucco cinereiceps.

Gymnobucco cinereiceps Sharpe, Ibis, 1891, p. 122; 1892, p. 310 (Mt. Elgon); id. Hand-l. B. ii. p. 180 (1900).

Nos. 1118, 1119. 3 and and a Forest, 6000 feet, May 19, 1898. Bill black, lower mandible with slaty marbling on lower side; feet black; iris bright straw-coloured. Appears to be fairly plentiful in thick forets. Several other individuals were seen in an opening in Nandi Forest, where large numbers of trees had been killed by fire.

334. BARBATULA AFFINIS.

Barbatula affinis Reichen.; Shelley, Cat. B. Brit. Mus. xix. p. 41 (1891); Reichen. Vög. deutsch. Ost-Afr. p. 117 (1894); Hartert, Ansorge's African Sun, p. 335 (1899: Taru).

No. 25. 2 ad. Kibwezi, 3000 feet, March 3, 1892.

a. Ad. Kinani, Sept. 22, 1894.

No. 690. 3 ad. Ravine, July 24, 1897. Bill black; feet slate-coloured; iris brown.

335. BARBATULA JACKSONI. (Plate XVI. fig. 2.)

Barbatula jacksoni Sharpe, Bull. Brit. Orn. Club, vii. p. vii (1897: Mau); id. Hand-l. B. ii. p. 182 (1900).

No. 101. 3 ad. Ravine, June 19, 1896. Bill black; feet slate-coloured; iris brown. Fairly plentiful in the forest.

Nos. 572, 586. 3 9 ad. Ravine, March 28, 30, 1897.

No. 979. & ad. Nandi, 6500 feet, April 13, 1898.

No. 1023. 3 ad. Nandi, 6500 feet, April 22, 1898. Plentiful. Makes a plaintive piping call.

No. 1242. Sad. Nandi, 6500 feet, June 26, 1898. Very plentiful.

336. BARBATULA LEUCOLÆMA.

Barbatula leucolæma J. & E. Verr.; Shelley, Cat. B. Brit. Mus. xix. p. 45 (1891); Reichen. J. f. O. 1892, p. 25 (Bukoba; Manjonjo); id. Vög. deutsch. Ost-Afr. p. 117 (1894); Hartert, Ansorge's African Sun, p. 335 (1899: Mondo).

No. 42. ? ad. Entebbe, Oct. 2, 1895.

337. BARBATULA LEUCOMYSTAX.

Barbatula leucomystax Sharpe, Ibis, 1892, p. 310 (Sotik); id. Hand-l. B. ii. p. 182 (1900).

No. 517. ? ad. Ravine, March 7, 1897. Bill dark brownish black; feet dark slate-coloured; iris brown. Fairly plentiful. Breeding. I found a nest in February in the dead branch of tree. A small hole made by the birds. No nest. Eggs two, white, much incubated. Stomach full of yellow fruit.

338. Trachyphonus erythrocephalus.

Trachyphonus erythrocephalus Cab.; Shelley, Cat. B. Brit. Mus. xix. p. 102 (1891); Sharpe, Ibis, 1892, p. 310 (Kikumbuliu; Kitina); Reichen. Vög. deutsch. Ost-Afr. p. 119 (1894: Taweta); Neum. J. f. O. 1900, p. 199 (Umbugwe; Zaowi, Ulu Mts.; Taro Steppe).

No. 383. 3 ad. Njemps, Sept. 26, 1896. Bill dusky pinkish brown; feet horn-blue; iris brown. Another seen. Not nearly so plentiful as *T. arnaudi*.

339. Trachyphonus arnaudi.

Trachyphonus arnaudi (Des Murs); Shelley, Cat. B. Brit. Mus. xix. p. 105 (1891); Sharpe, Ibis, 1892, p. 311 (Turquel); Reichen. Vög. deutsch. Ost-Afr. p. 119 (1894); Neum. J. f. O. 1900, p. 199 (Ssero, N.W. Masailand).

Nos. 260, 261. 3 2 ad. Elgeyu, 3700 feet, Aug. 14, 1896. Bill dusky horn-white; feet pale horn-blue; iris brown.

340. Trachylæmus elgonensis.

Trachyphonus elgonensis Sharpe, Ibis, 1891, p. 122; 1892, p. 310 (Mt. Elgon).

Trachylæmus elgonensis Sharpe, Hand-l. B. ii. p. 187 (1900). Nos. 133, 154. & ad. Nandi, 6500 feet, July 1, 5, 1896. Bill and bare skin of eye yellow; feet slate-coloured; iris crimson.

No. 907. 9 ad. Ravine, 7500 feet, March 7, 1898.

No. 1190. 3 ad. Nandi, 6500 feet, June 4, 1898. Bill and bare skin of face yellow; feet slaty black, edge of scales dull light green; iris brown. Breeding. I found a nest containing four young in an old Woodpecker's hole about forty feet from the ground. The tree was partly dead, and on the edge of a thick belt of forest. There were five or six other holes in the dead portion of the tree-trunk.

341. Dendromus nubicus.

Campothera nubica (Gm.); Hargitt, Cat. B. Brit. Mus. xviii. p. 93 (1890); Sharpe, Ibis, 1892, p. 307 (Savé, Mt. Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 121 (1894).

Dendromus nubicus Neum. J. f. O. 1900, p. 202 (Nguruman; Ngaruka; Kwa Kitoto).

No. 399. 3 ad. E. Kamassia, Sept. 30, 1896. Bill dusky slate-coloured; feet dark green; iris crimson.

No. 624. 9 ad. Ravine, April 12, 1897. Scarce.

The variation in a series of *Dendromus nubicus* is simply extraordinary, especially as regards the spotting and barring of the back and under parts. I have come to the conclusion that the barring of the flanks is more or less a sign of immaturity. The birds from the White Nile (true D. nubicus) differ slightly in the prominence of the spots of the under surface and the clearness of the white spots on the crown in the female, but I find that they can be matched by Abyssinian birds. Of the former, called by Dr. Reichenow D. neumanni, Mr. Jackson only got a single specimen, from Kamassia: this is coarsely marked, and has a few black spots continued up to the chin. This specimen, identified by Mr. Oscar Neumann as D. neumanni, can almost be matched by specimens from Shoa and Southern Abyssinia, Arabsyio and Jifa Medir in Somaliland. The Kamassia bird is the only one which has the spots continued up to the chin, but the black spots on the chest and the dark bars on the flanks are found in all the specimens above mentioned. At the same time

there are many other examples from Abyssinia which are hardly separable.

The following forms seem to require names:-

342. Dendromus pallidus, n. sp.

♀. Similis D. nubico, sed notæo toto et alis distinctè et lætè albidis, vix aureo tinctis transfasciatis, et gastræi maculis nigris minoribus distinguendus. Long. tot. 7·3, culm. 0·9, alæ 4·0, caudæ 2·35, tarsi 0·7.

Typus in Mus. Brit. ex Lamu (Jackson).

The chief character for the separation of the Lamu Woodpecker is, of course, the complete and regular banding of the back and wings; but there are other characters, viz., the larger and closer white spotting on the crown and the much smaller number of spots on the under surface, especially on the under wing-coverts. The red on the head seems to me to be more scarlet than crimson, as is the case with *D. nubicus*.

There are three specimens, two females and a male, from Lamu, in the British Museum.

343. DENDROMUS HARGITTI, n. sp.

♀. Similis D. punctato, sed fronte et vertice antico nigris, albo punctulatis minime striolatis, remigum rachidibus brunneis nec aureis distinguendus. Long. tot. 78, culm. 0.95, alæ 4.35, caudæ 2.3, tarsi 0.85.

Typus in Mus. Brit. ex Semmio, Niam-Niam (Bohndorff).

Dr. Reichenow has made some remarks on African Woodpeckers in the 'Monatsbericht' for 1896 (p. 130). He points out that the bird identified by me and by Mr. Hargitt as Picus balius is not the true P. balius of Heuglin, which, from an examination of the type in Stuttgart, he declares to be scarcely separable from P. punctatus Val. The principal difference is that the upper surface is not spotted, but clearly cross-banded. Such a specimen is in the Museum from Senegambia, whence we have also several other individuals with spotted backs. I do not think that the banded bird can be specifically distinct from P. punctatus, but I believe that a large amount of variation in the spotting and banding of these African Woodpeckers is to be expected. At all events, it is clear that the banded birds are not peculiar to

N.E. Africa. It follows, therefore, that the bird from Niam-Niam is not *P. balius*, but requires a new name, which I propose shall be *Dendromus hargitti*. At the same time Professor Reichenow makes some important identifications respecting *Chrysopicus caillaudi* of Malherbe. This he considers to be identical with *D. malherbii*, and therefore he proposes the name of *Dendromus scriptoricauda* for the bird which Hargitt identified as *D. caillaudi*.

We have not, apparently, in the Museum a specimen of *Dendromus nyansa* of Neumann (J. f. O. 1900, p. 204) from Muansa, but the Museum contains three examples of *D. fülleborni* Neum. from Nyasaland: these have been identified by Captain Shelley as *D. malherbii*, but they really belong to the distinct form recently separated by Mr. Oscar Neumann.—R. B. S.]

344. Dendromus tæniolæmus.

Campothera tæniolæma Reichen. & Neum. Orn. MB. 1895, p. 73 (Masailaud and Eldoma Station, Mau); Hartert, Ansorge's African Sun, p. 335 (1899: Subugo Forest).

Dendromus tæniolæmus Neum. J. f. O. 1900, p. 205, pl. i. fig. 1; Reichen. Vög. Afrikas, ii. p. 172 (1890).

No. 400. 3 ad. Ravine, Oct. 6, 1896. Bill dusky horn-coloured, base of lower mandible horn-blue, tip dusky; iris dark crimson. Amongst dead pine trees in the shambas. Several seen.

No. 635. \(\partial \) ad. Ravine, April 19, 1897. Feet green. Scarce.

No. 1008. 2 ad. Nandi, 6500 feet, April 19, 1898.

345. Dendropicus massaicus.

Dendropicus guineensis massaicus Neum. J. f. O. 1900, p. 206 (Ndalalani).

Dendropicus cardinalis (part.) Hargitt, Cat. B. Brit. Mus. xviii. p. 295 (1890).

Nos. 46, 47. & 9. Kibwezi, March 11, 1892.

[This is a pale form of *D. cardinalis*, recalling by its lighter aspect the differences between *Dendromus jacksoni* and *D. nubicus.*—R. B. S.]

346. Dendropicus simoni.

Dendropicus simoni Grant, Bull. B. O. C. x. p. xxxviii (1900); id. Ibis, 1900, p. 304 (Konduro, Abyssinia).

Dendropicus simonis Sharpe, Hand-l. B. ii. p. 218 (1900).

No. 188. ♀ ad. Ravine, July 22, 1896. Bill slate-coloured; feet greenish horn-coloured; iris brown.

No. 189. 2 ad. Ravine, July 22, 1896. Bill slate-coloured, lower mandible horn-blue with slate-coloured tip; feet olive-green; iris dark crimson.

No. 511. 3 imm. Ravine, March 5, 1897. Fairly plentiful and frequently found on a dead tree. Makes very little noise when pecking, and unless one stands close up to or under the tree it cannot be heard.

No. 552. 9 ad. Ravine, March 22, 1897.

No. 924. 9 ad. Nandi, 6500 feet, March 22, 1898.

Nos. 1077, 1078. 3 2 ad. Nandi, 6500 feet, May 6, 1898. Bill dark slate-coloured, lower mandible dusky hornblue; feet olive-green; iris crimson-brown. This, the smallest of our Woodpeckers, is fairly plentiful in Nandi.

Nos. 1088, 9 ad.; 1094, 3 imm. Nandi, 6500 feet, May 9, 10, 1898.

No. 1164. 3 ad. Nandi, 6500 feet, May 28, 1898.

[Prof. Reichenow (Orn. MB. 1901, p. 167) believes that D. simoni is D. lepidus (Cab. & Heine).—R. B. S.]

347. Thripias schoensis.

Thripias schoensis (Rüpp.); Hargitt, Cat. B. Brit. Mus. xviii. p. 308 (1890).

Thripias namaquus schoensis Hartert, Nov. Zool. vii. p. 33 (1900: Nairobe).

No. 266. 3 ad. Elgeyu, 3700 feet, Aug. 15, 1896. Bill dark horn-blue, lower mandible paler; feet slate-coloured; iris crimson. One of a pair.

No. 523. & ad. Ravine, March 7, 1897.

[These specimens have quite a greenish shade on the under parts, as well as on the upper surface. I think, however, that this indicates freshness of plumage, as it is to be noticed in the specimen killed at Nairobe by the Mackinder Expedition, and in a greater or less degree by other examples from Somaliland and the Niam-Niam country.—R. B. S.]

348. MESOPICUS PŒOCEPHALUS.

Mesopicus goertan (part.) Hargitt, Cat. B. Brit. Mus. xviii. p. 368 (1890); Sharpe, Ibis, 1892, p. 308 (Turquel).

Mesopicus goertæ centralis Reichen. Orn. MB. viii. p. 59 (1900).

Mesopicus pæocephalus (Swains.); Grant, Ibis, 1902, p. 425.

a. 3 ad. Entebbe, March 13, 1895.

b. 3 ad. Entebbe, May 18, 1895. Bill greenish horn-coloured; feet scaly slate-coloured; iris cinnamon-brown.

[Dr. Reichenow (Orn. MB. 1900, p. 58) has proposed to separate this species into four races, the first being the true *M. goertan* from Senegal. This is a bird with light oliveyellow back, while the under surface is very pale ashy, with a yellowish patch on the abdomen, sometimes indistinct and sometimes absent altogether. The light coloration, however, distinguishes this form, which is confined to Senegal.

M. goertan pæocephalus is said by Dr. Reichenow to differ in the paler and greyer tone of the olive-yellow of the upper surface, and in the middle of the belly being only slightly washed with a tint of orange-yellow. Hab. West Africa from Gambia to Loango.

M. goertan abyssinicus, from Abyssinia, Kordofan, and Sennar, is said to be distinguished by the darker olive-green of the upper surface and the scarlet abdominal spot, which is surrounded by a wash of yellow.

There is certainly more of a red spot on the abdomen in Abyssinian and Sudanese birds, but it is often absent altogether, and then there is no tangible difference between Eastern and Western birds. It is impossible to distinguish between a bird from Fashoda and one fron the Fantee country.

M. goertan centralis is another race, according to Dr. Reichenow, found from the Gazelle River to the Niam-Niam and Sük countries. It is said to be like M. g. abyssinicus, but

with the under surface as in M. pæocephalus, the centre of the abdomen being only slightly washed with yellow.

I have six specimens from Niam-Niam now before me. All are clearly washed with yellow on the abdomen, and three of them $(2 \ 3, 1 \ 2)$ have the centre of the belly scarlet.

All Mr. Jackson's specimens are washed with yellow, and one male has a distinct trace of scarlet on the centre of the lower breast and abdomen. They are rather light olive-yellow on the upper surface, and approach in tint typical *M. goertan* from Senegal.

In the case of Woodpeckers, birds which quickly wear their plumage out and get it soiled, it is very difficult to institute comparisons of specimens exactly in the same state of plumage; while in the case of *M. goertan*, I think that all the characters for the separation of races are very unstable, and I consider that Mr. Grant was right in saying that Dr. Reichenow's races cannot be upheld (Ibis, 1902, p. 425). Attention should be called to the way in which the bars on the wings and tail vary in extent, these being sometimes altogether absent on the latter. There are often dusky bars on the sides of the body, but most of these characters are indications of immaturity, as already pointed out by Mr. Hargitt (Cat. B. xviii. p. 370).—R. B. S.]

349. IYNX PECTORALIS.

Iynx pectoralis Vig.; Hargitt, Cat. B. Brit. Mus. xviii. p. 565 (1890); Sharpe, Ibis, 1892, p. 308 (Savé, Mt. Elgon); Reichen. Vög. deutsch. Ost-Afr. p. 120, fig. 54 (1894: Lake Naivasha); Neum. J. f. O. 1900, p. 201 (Ssubugo, N.W. Masailand).

No. 163. ? ad. Nandi, 6500 feet, July 8, 1896. Bill dusky horn-coloured; feet greenish horn-coloured; iris pale brown. Two seen.

Nos. 344, 345. 3 9 ad. Ravine, Aug. 30, 1896.

No. 476. & ad. Ravine, Feb. 21, 1897.

Nos. 691, 692. 3 9 ad. Ravine, July 24, 1897.

No. 762. S juv. Lake Naivasha, Aug. 12, 1897.

[The nesting of *I. pectoralis* at Lake Naivasha is a very interesting circumstance. After comparing Mr. Jackson's series of specimens with our own set from South Africa, I find that the same variations in markings run throughout them all. The number of dark bands on the tail varies, apparently, from seven to ten, and, in some instances, the dark bars become obsolete.—R. B. S.]

[To be continued.]

XL.—On a small Collection of Birds from Tripoli. By J. I. S. Whitaker, F.Z.S., M.B.O.U.

For some years past I had entertained the idea of visiting Tripoli and Cyrenaica, or, failing the opportunity of going myself, of sending a collector in my stead, with a view of obtaining some information regarding the Ornis of those hitherto—by the ornithologist at least—practically unexplored countries. Beyond a few notes by sportsmen, or other travellers who have visited the town of Tripoli and its immediate neighbourhood, nothing has, I believe, thus far been published concerning the fauna of this part of North Africa, which, although so near to Europe, seems yet so far off as regards our knowledge of it; the Tripolitan hinterland being indeed less known, and far more of a terra incognita to us, than many parts of Central Africa.

Owing, however, to the Ottoman Government having of late years prohibited Europeans from penetrating into the interior of the Vilayet, unless provided with special permission, and to the fact of this permission being extremely difficult to obtain, particularly by an Englishman, in consequence of the somewhat strained relations existing between our country and the Porte, I had until last year been obliged to forego my good intentions, and await the issue of events. Finally, in the spring of 1901, thanks to the kind intervention of the British Museum, I succeeded in obtaining, through our Foreign Office, the long wished for permission,

and not being myself able to undertake the journey, I despatched Mr. Edward Dodson on the interesting mission.

Mr. Dodson, accompanied by an assistant taxidermist, Mr. Drake, left London in the early part of March 1901, and after calling en route at Malta, reached Tripoli about a fortnight later. Here a stay of ten days was made for the purpose of purchasing the necessary transport animals, and making other preparations for the journey into the interior. From the outset, notwithstanding the Turkish Sultan's passport, difficulties were placed in the way of the travellers by the local authorities, the Vali of Tripoli, among other things, refusing to allow their cartridges to be carried into the country; a fresh permit therefore had to be asked for, and received, from Constantinople, authorizing the introduction of ammunition.

Finally the party, consisting of the two Englishmen, with their Arab retinue, camels and horses, and a small obligatory escort of Turkish soldiers, left Tripoli on the 1st of April.

The following is a brief outline of the inland journey:—
Travelling first in a south-easterly direction, and crossing a belt of shifting sand-dunes, almost destitute of life, the caravan entered a cultivated region inhabited by nomad Arabs, who were most hospitable and kind to the travellers, supplying them with food, and otherwise assisting them. A few birds were collected there, but the species were not many, nor were the individuals numerically plentiful, except as compared with those met with further south. Ascending the Wed-Lipteha, where water was fairly abundant, and crossing the Tarhuna hills, a plateau was reached, covered with Halfa or Esparto grass; in this district numerous important ruins bear evidence of the extent and strength of the Roman occupation.

The aspect of the country now gradually became more barren and stony, finally culminating in absolute desert at Beni-Oulid, which was reached on the 8th of April. A trying time was there in store for our travellers, owing to the great heat caused by the parching desert wind, the so-called "gebleh," and to the absence of water, which was only obtainable at places ten to twelve hours march distant from each other. "During the 'gebleh winds,'" Mr. Dodson wrote, "we had simply to hide in our tents and cover our heads with cloths, as it was often quite impossible to travel through the blinding, drifting sand, which made one's nose and lips crack and bleed."

Two weeks after leaving Tripoli, the caravan arrived at Sofedjin, about 120 miles to the south-east of that town, and after a short stay there, continued its march to Bonjem Oasis. Between Sofedjin and Bonjem some trouble was experienced with the Wafella Arabs, an ambush which had been prepared for the Englishmen being fortunately discovered by them in time and the treacherous Arabs discomfited. The country in this neighbourhood was very rocky and barren, but intersected by numerous oueds, or dry torrent-beds, in some of which large patches of brilliantlycoloured flowers were to be seen, which on approach proved to be "immortelles," or everlasting flowers. On the road to Bonjem a halt was called at Faskir Zumzum, where an important Roman reservoir exists in a wonderful state of preservation, its stonework and cement being as good and as water-tight as ever. Few birds of any species were to be met with thereabouts, but gazelles (Gazella dorcas) appeared to be numerous, judging from their tracks, and one of these animals was shot. At Bonjem, which was reached on the 21st of April, our travellers hoped to find fresh food, but were disappointed, the few inhabitants of the place being themselves on the verge of starvation, and their diet at the time consisting almost solely of Yellow Wagtails (Motacilla flava). These birds happened just then to be passing on migration, and considerable numbers of them were trapped and snared by the famished natives. Failing other food, the Arabs of these districts often subsist to a great extent upon snails and palm-juice. In consequence of the hardships endured during the march, and to a want of proper diet, one of the Turkish soldiers died about this time. Apparently the poor man had been suffering previously from an attack of severe gastritis,

and should never have been sent by the authorities on a journey of this sort.

On the 26th of April, after four days of hard and incessant marching through waterless desert, the caravan arrived at Sokna, an oasis and town situated about 350 miles south of Tripoli, with a population of 2000 natives and a Turkish garrison of 200 men. Here a week's halt was made to recruit the exhausted forces of both man and beast after their forced march across the desert. During the stay at Sokna some collecting was done, both of birds and small mammals; but of the former there were but few species, the Desert Sparrow (Passer simplex) and the Coronetted Sand-Grouse (Pterocles coronatus) being among the most noteworthy.

More dust-storms were experienced about this time, and one night some torrential rains also fell. On the 4th of May, Mursuk having been fixed on as the furthest southern limit of the expedition, the journey was resumed in that direction, and the following day the caravan entered the range of the Djebel Soda, or Black Mountains, as they have appropriately been called, from the colour of the stone of which they are formed. Two days after crossing this range water was met with, and all the water-skins were then filled, and preparations made for another long waterless desert march.

A caravan from the coast was here encountered, which had suffered greatly from the "gebleh" winds and lost one-half of the flocks with which it had started. Gazelles (Gazella dorcas) were numerous here, and a nice specimen was added to the collection, as was also a hyæna (Hyæna striata).

On the 11th of May a little pasturage was reached, and the camp was pitched for a well-earned rest after the forced march of 15 and 18 hours at a stretch just accomplished; but another terrific storm brought the tents to the ground, and rendered the night miserable. The horses of the caravan too, maddened by hunger and thirst, stampeded during the night, and were never afterwards recovered, although two days were spent in diligently searching for them.

On the 14th of May the small oasis (and village) of Zighen

was reached, and on the 19th the more important town of Sebka, both in the Province of Fezzan. Not far from the latter place a wonderful petrified forest was traversed, its area covering many miles, so many indeed that it took the caravan ten hours of continuous travelling to cross it. The petrified trees, which varied in circumference from seven feet to a few inches, were all lying prone on the ground. A similar forest, although on a much smaller scale, exists near Cairo, and apparently Dr. Sven Hedin met with another in his recent journey through Central Asia. As in some other Saharan regions, marine shells were found here, pointing to the fact of a submarine existence at some remote period.

On the 25th of May, or three weeks after leaving Sokna, the expedition arrived at Mursuk, the capital of Fezzan, and the seat of government of that Province. Mursuk is a large and important town, with its oasis, situated some 300 miles south of Sokna, and about 650 miles south-east of Tripoli.

Here, owing to the Vali of Tripoli having omitted to advise the Mutarharif, or Governor of Mursuk, of the probable arrival of an European expedition travelling under the ægis of the Sultan's *Iradé*, the whole party was placed under arrest, and the Turkish escort imprisoned. Fortunately, however, it was possible to clear up the matter to the satisfaction of the local authorities, and the travellers were immediately released.

After a few days spent at Mursuk, the expedition, having attained its southermost limit, retraced its steps as far as Sokna, following, more or less, the same route as on its outward journey. From Sokna, in order to carry out the projected itinerary, Mr. Dodson decided to travel in a north-easterly direction as far as the Gulf of Syrtis, and then, skirting along the coast, to enter Cyrenaica, and follow the bend of the coast-line up to Benghazi.

The districts traversed by the Expedition between Sokna and the coast had hitherto been practically unexplored by Europeans, and Mr. Dodson was able to map out a considerable tract of country and to correct certain glaring errors